

REMARKS/ARGUMENTS

In complying with the requirement of restriction and election, we elect the group II claims (claim 6-9), however, we would like to have the requirement of restriction reconsidered upon the currently amended claims for following reasons:

1). The original set of claims from previous application have not been correctly constructed to clearly demonstrate the dependency among the three group of claims (group I claims 1-5, group II claims 6-9 and group III 10~15). In particular, because of the interchanging use of gene expression pattern, gene expression signature and the gene expression profiles, the examiner considered that the method of group I, which is directed to detecting gene expression pattern, the apparatus of group II, which processes gene expression profiles and the method of Group III, which utilized wavelets to extract gene expression signature, have different functions, effects and modes of operation.

2). Among the currently amended claims, the group I claims disclose a method to define gene expression pattern by the gene signature extracted from gene expression profiles in generic term. The method disclosed by group I claims includes steps of extracting gene signature from gene expression profile and defining the expression pattern by the extracted gene signature. The group III claims disclose the specific method on how to extract gene signatures upon which the gene expression pattern is defined. Hence both group of claims are direct to gene expression profiles. Both group I and III claims have the function of extracting the gene signature from the expression profiles, except that group III define the transformation on the frequency domain while method in group I claims covers more form of transformation in extracting the gene signature. Therefore, the method disclosed by group III claims is a more specified component of the method disclosed by group I claims.

3) Among the currently amended claims, the group II claims disclose the apparatus for the practice of group I and III claims. The apparatus disclosed by group II claims are specifically implemented to carry out the method disclosed by the group I and III claims. In particular, the apparatus defines the gene expression pattern based on gene signatures that are extracted from expression profiles by wavelet transformation. Such apparatus specified in detailed among the group II claims has been optimized for the method disclosed by the group I and III claims. No other apparatus will be more close to the method and processes defined by the group I and III claims. And because of the specific requirement defined by the group I and III claims, the apparatus disclosed by group II claim cannot be used to practice other materially different process either. Therefore, the group II claims is related to the group I and III claims.

Applicants respectfully looking forward to the notice of further office action

Respectfully submitted
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